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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/582,207	04/16/2007	Herbert Praschak	65736(49338)	4000
21874 7590 02/19/2010 EDWARDS ANGELL PALMER & DODGE LLP P.O. BOX 55874 BOSTON, MA 02205			EXAMINER	
			MANOHARAN, VIRGINIA	
DOSTON, MA	02203		ART UNIT	PAPER NUMBER
			1797	
			MAIL DATE	DELIVERY MODE
			02/19/2010	PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

	Application No.	Applicant(s)				
Office Action Commence	10/582,207	PRASCHAK, HEI	PRASCHAK, HERBERT			
Office Action Summary	Examiner	Art Unit				
	Virginia Manohara	n 1797				
The MAILING DATE of this communicated Period for Reply	The MAILING DATE of this communication appears on the cover sheet with the correspondence address Period for Reply					
A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.  - Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.  - If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.  - Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).						
Status						
1) Responsive to communication(s) filed	on 30 November 2009					
·	) This action is non-final					
<i>'</i>	<del>'</del>		e merits is			
	Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under <i>Ex parte Quayle</i> , 1935 C.D. 11, 453 O.G. 213.					
Disposition of Claims	,	·				
· <u>_</u>	-li4i					
	Claim(s) <u>1-13</u> is/are pending in the application.					
	4a) Of the above claim(s) is/are withdrawn from consideration.					
5) Claim(s) is/are allowed.						
<u> </u>	6) Claim(s) 1-13 is/are rejected.					
7) Claim(s) is/are objected to.	on and/or alaction requirer	ont				
8) Claim(s) are subject to restriction	on and/or election requirem	ent.				
Application Papers						
9)☐ The specification is objected to by the I	Examiner.					
10)☐ The drawing(s) filed on is/are: a)☐ accepted or b)☐ objected to by the Examiner.						
Applicant may not request that any objection	on to the drawing(s) be held in	abeyance. See 37 CFR 1.85(a).				
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).						
11) The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.						
Priority under 35 U.S.C. § 119						
<ul> <li>12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).</li> <li>a) All b) Some * c) None of:</li> <li>1. Certified copies of the priority documents have been received.</li> <li>2. Certified copies of the priority documents have been received in Application No</li> <li>3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).</li> <li>* See the attached detailed Office action for a list of the certified copies not received.</li> </ul>						
Attachment(s)  1) Notice of References Cited (PTO-892)  2) Notice of Draftsperson's Patent Drawing Review (PTO-948)  4) Interview Summary (PTO-413) Paper No(s)/Mail Date						
3) Information Disclosure Statement(s) (PTO/SB/08) Paper No(s)/Mail Date	5) 🔲 N	lotice of Informal Patent Application other:				

## **DETAILED ACTION**

Claims 1-13 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

- a). The phrases "adapted to" and/or "adapted for" provide for ambiguity and confusion because it is unclear how a structure can be adapted to or adapted for a function.

  Could it not perform the function before it was adapted to thus perform?
- b). The claimed "being configured" fails to ascertain the claimed invention with precision. How is the evaporator <u>having an exit for product vapor being configured to be</u> heated by process waste steam, recited in claim 1, as the specific configuration is not recited in the claims? Deleting the above terms in the claims would obviate the rejection.

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

Claims 1-10 are rejected under 35 U.S.C. 103(a) as being unpatentable over the DE 2632910 or Dyer (4,437,316) with or without Drew et al (3,763,020).

The GE '910 or Dyer is applied for the same reasons as set forth at the paragraph bridging pages 4 and 5 of the previous Office Action. "The claimed the vapor compression stage being adapted to lower the given dew point temperature of the evaporator below the defined temperature required for heating the process stage and to

raise the temperature of the product vapor to the <u>defined</u> temperature by <u>compressing</u> the product vapor is a known expediency in the art. See e.g., the abstract and col. 3, lines 48-67 through cols. 4-7. To combine the references would have been obvious to one of ordinary skill in the art, inasmuch as all the references are directed to similar processing environment, i.e., to an evaporation and vapor compression system in the respective system.

Page 3

Claims 11-13 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

Applicant's arguments filed November 30, 2009 have been fully considered but they are not persuasive.

Applicant's arguments such as: "... neither of Brand and Dyer discloses a vapor compression stage connected to a product vapor exit of the evaporator and adapted to lower the given dew point temperature of the evaporator below the defined temperature required for heating the process stage and to raise the temperature of the product vapor to the defined temperature, as recited in amended Claim 1. Instead, in Brand since the separator 44 is common to both the heating device 42 and the heating device 43, the mechanical compressor 53 only compresses a part of the product vapors and the rest is supplied to the heating device 24 of a second stage evaporator. Simply put, mechanical compressor 53 is not positioned to lower the dew point of the first evaporator or heating device 42 to a temperature below the heating temperature of the heating device 24...

...Dyer does not discuss lowering the dew point temperature of the first evaporator by

Application/Control Number: 10/582,207

Art Unit: 1797

means of a compression stage below the temperature necessary for heating the second evaporator..." are not persuasive of patentability because of the following reasons: Brand or Dyer teaches or suggests the claimed "vapor compression stage". In fact, applicant admits that "..in Brand the mechanical compressor 53 compresses a part of the product vapors and the rest is supplied to the heating device 24 of a second stage evaporator". The claims are not limited to the above argued "compresses a part of the product vapors" commensurate with the argument. Also, the argued "the rest is supplied to the heating device 24 of a second stage evaporator", although not required by the claims, are not excluded therefrom. The term "comprising" in the instant claims is allinclusive. Furthermore, that Brand nor Dyer "does not discuss lowering the dew point temperature of the first evaporator by means of a compression stage below the temperature necessary for heating the second evaporator..." as argued is of no patentable moment. The claims are directed to apparatus, which are not patentably distinguished from the apparatus of Brand or Dyer by the mere reliance on dew point temperature and compression stage or by the mere recitation of a particular use to which the apparatus is to be put. It is noteworthy that the claimed "vapor compression stage" and "process stage" are more process rather than apparatus or system to which the claims are directed. [A process limitation is not the basis of patentability for an apparatus claim]. Brand or Dyer's compressor possesses the capability of performing similar functions as the claimed "vapor compression stage". The claim language, i.e., "... lowering the dew point temperature of the first evaporator by means of a compression stage below the temperature necessary for heating the second evaporator..." relied

Page 4

upon by applicant to distinguish over Brand or Dyer is a functional language. Courts have interpreted functional language in an apparatus claim as requiring that the apparatus possess the capability of performing the recited function. See Intel Corp. v. U.S. Int'l Trade Comm'n, 946 F.2d 821,832 (Fed. Cir. 1991.)

Applicant fails to delineate specific structure not shown nor render obvious by the prior art. The lowering or raising of the dew point temperature as a function of compression is not an unobvious subject matter, nor is it evidence of criticality in the art as taught by Drew, discussed supra.

Absolute predictability is not a prerequisite for obviousness rejection All that is required to show obviousness is that the applicant make his claimed invention merely by applying, knowledge clearly present in the prior art. Section 103 requires us to presume full knowledge by the inventor of the prior art in the filed of his endeavor. See In re Winslow, 53 CCPA 1574, 1578, 365 F.2d 1017, 1020, 151 USPQ 48, 50-51 (1966). No commercial success is claimed, nor is any other factor indicating No commercial success is claimed, nor is any other factor indicating non-obviousness is seen to exists.

The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

Wallace and Shook both disclose a vapor compression system.

Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP

Art Unit: 1797

§ 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Virginia Manoharan whose telephone number is 571-272-1450.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Glenn Caldarola, can be reached on 571-272-1444.

The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should

Application/Control Number: 10/582,207 Page 7

Art Unit: 1797

you have questions on access to the Private PAIR system, contact the Electronic

Business Center (EBC) at 866-217-9197 (toll-free).

/Virginia Manoharan/ Primary Examiner, Art Unit 1797